International Journal of Economics and Financial Issues
Vol. 2, No. 1-2, 2021, pp. 1-21
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ARF INDIA
Academic Open Access Publishing
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IFRS ADOPTION AND VALUE RELEVANCE OF FINANCIAL INFORMATON OF LISTED DEPOSIT MONEY BANKS IN NIGERIA

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Article History

Received : 18 November 2020
Revised : 25 November 2020
Accepted : 8 December 2020
Published : 3 May 2021

Key words

Pre IFRS, Post IFRS, value relevance, deposit money banks, Nigeria

Abstract: The pervasiveness of the need for publication of General purpose financial statements cannot be overemphasized as it provide various stakeholders – shareholders, employees, suppliers, creditors, financial analysts, stockbrokers and government agencies – with timely, reliable and relevant information useful for making informed decisions. Globalization and The records of compromise in the objectivity of financial information quality have resulted to several crises in the capital market. Hence, prompted the need for a single set of high quality reporting standards which were first adopted in 2005 by EU countries while Nigeria agreed to adopt in 2012. This paper examines international financial reporting standard adoption thereby comparing the PRE/ POST adoption period and the value relevance of accounting information of listed Deposit Money Banks (DMBs) in Nigeria. This study employed a correlational and Ex-post facto research design of which the Edwards Bells and Olhson (1995) model was adopted. Data on Earnings per share (EPS), Book value per share (BVPS), Change in earnings per share (CEPS) and Share price (SP) were sourced from the published annual reports of 7 listed banks to conduct a pre (2008 to 2011) and post (2012 to 2015) compulsory adoption analysis. The General least square (GLS) regression model documented that both the Pre and post compulsory adoption of IFRS period financial information are value relevant though, IFRS adoption is yet to maximize its aim as the post IFRS adoption financial information has no relative value relevance over pre IFRS financial information. The study therefore, recommends a need for strong enforcement effort, rigorous IFRS training and good corporate governance.

1. INTRODUCTION

The value and pervasiveness of accounting information cannot be overemphasized in decision making process and it is determined by how well it meets stakeholder's needs. The Value of this information is affected by a number of factors of which Accounting standards are the most important since High quality accounting standards and their appropriate enforcement are seen as providing consistent, comparable, relevant and reliable financial information (Verriest, 2007).

In this study of IFRS adoption and value relevance of accounting information, earnings (Earnings per share and Change in earnings per share), book value per share and share price of Nigerian listed Deposit money banks (DMBs) are the basic accounting numbers that made up the model that was employed for the pre and post IFRS adoption analysis. Aided by globalization and series of scandals, the adoption of IFRS was accepted all over the world with several countries using it as their main financial reporting framework. This resulted in companies being able to compare performances across borders as well as raise capital both within and outside their shores. The adoption of IFRS has affects many aspects of accounting (Akpaka, 2014). In view of this, Delloite (2013) reported that the inception of IFRS has led to the use of a variety of definitions for elements of financial statements like assets, liabilities, equity, income and expenses. It has also resulted in the use of different criteria for the recognition and measurement of items in the financial statements. In addition, Galaen & Stenheim (2010) recognized that the shift to IFRS represents substantial change in recognition and measurement of accounting numbers and it is reasonable to believe that adoption of IFRS will affect the quality of accounting numbers

Talebnia, Valipour & Askari (2011) opined that earnings and book value of equities are measures that different individuals, investors and financial analysts use to evaluate the performance of the enterprise. While earnings provide a measure of how the firm's resources are currently used, book value provides a measure of the value of the firm's resources independent of how the resources are currently used. Earnings can be said to represent income statement while book values represent the balance sheet. IFRS brought about changes in definition, measurement, recognition of income, intangibles and the use of fair value. Consequently, IFRS affects the accounting figure of earnings and book value of firm. Therefore, there is a great need to investigate if those accounting information are properly reflected in the consequent stock price. Hence, fair value measurement has been identified to be one of the most outstanding changes in IFRS as Akpaka (2015) stated that, one critical element is that IFRS rely heavily on fair value accounting as opposed to concept of historical cost. Though, Christensen and Niklovaev (2009) put forth that adoption of fair value will allow for wider use of fair value for non-financial assets. However, it has been criticized as Dimos (2011) noted that the use of fair value in financial reporting is not unanimously accepted based on the argument of unreliable numbers, especially when assets and liabilities are unique and their measurement is based on subjective assumption. Argument in favour of fair value opined by Christensen and Niklolaev (2009) is that commitment to fair value accounting does not favour returns on asset and makes holding of unproductive assets more expensive and when fair value estimates are reliable it improves performance measurement.

The Nigerian banking industry is among the most regulated sector in Nigeria and has experienced several reforms ranging from the days of consolidation, down to the establishment of AMCOM as well as international participations as some of the listed deposit money banks Nigeria operates with international license. It is highly organized as corporate governance is seriously taken into consideration. With respect to the adoption of IFRS, the emergence of Financial Reporting Council of Nigeria (FRCN) in 2011 and the publication of the road map as stipulated by the road map committee that all public listed entities and significant Public interest Entities were mandated to adopt IFRS from 1st January 2012, financial instruments classification, impairment, recognition, hedge accounting, definition of debt versus equity have led to changes as well as a signal of change in the degree of value relevance of financial information presented by banks in Nigeria.

Fair value measurement as oppose historical cost measurement has been identified to be the conservative attribute of IFRS which has been seen as the foremost alteration that accompanied IFRS. Some researchers and scholars have argued that it gives a fair value view of firm book value which is in contrast to what is obtained under the historical cost measurement and as such, they viewed it as being more realistic. However, this paper covered a period of 8 years (2008 to 2015). This scope is divided into two equal halves of 4 years each in order to make comparism between the pre IFRS era and post IFRS era which was proxied by the variation in the share price, as earnings per share, change in earnings per share and book value per share serves as the explanatory independent variables for financial information. This period is chosen as covers the period of the policy change in 2012 as required by the Nigerian government for significant public entities to prepare the financial statement in compliance with the full provision of IFRS.

The major objective of this research is therefore to examine the impact of IFRS adoption on the value relevance of accounting information of listed DMBs in Nigeria. The following are the specific objectives:

(i) To assess the value relevance of Pre IFRS financial information (earnings, change in earnings and book values) in DMBs in Nigeria.

(ii) To evaluate the incremental value relevance of IFRS adoption on financial information (earnings, change in earnings and book values) on DMBs in Nigeria.

(iii) To investigate the relative value relevance of the post IFRS financial information over the pre IFRS financial information in DMBs in Nigeria.

To achieve the stated main objective, it is therefore hypothesized that IFRS adoption has no significant impact on the value relevance of financial information of listed DMBs in Nigeria. We therefore specifically, hypothesize (in null form) as follows:

(i) Pre IFRS financial Information has no significant value relevance in the Nigerian DMBs.

(ii) Post IFRS financial information has no significant value relevance in the Nigerian DMBs.

(iii) There is no significant difference between the value relevance of accounting information of the pre and post IFRS adoption in the DMBs in Nigeria.

This study increases the awareness about IFRS, its concept and challenges on accounting information as it is a recent phenomenon in Nigeria. The study will also be significant to managers of firms as it is very imperative to know how the newly introduced IFRS affects accounting ratios and the anticipated result will enhance a prudent forecast of shareholders and investors reaction.

The remaining of this paper is structured as follows; section two reviews literature related to this study and presents the theoretical framework. In section three, methodological issues are raised and discussed, and the model of the study was specified. Presentations and discussion forms the content of section four while section five concludes the work and proffers recommendations in the light of the major findings.

2. THEORY AND EVIDENCE

Several studies related to the adoption of IFRS have been published in recent years. Umoren and Enang (2015) study on IFRS adoption and value relevance of financial statements of Nigerian listed banks employed a relative and incremental research design on 12 Nigerian listed Banks covering the period of 2010 to 2013, revealed that the overall results on accounting numbers presented in this study indicate that the earning per share, book value of equity and share prices of commercial banks have significantly improved following IFRS adoption. This is in line with the study of Alali and Foote (2009) whose findings upon conducting a research on the value relevance of international financial reporting standards: empirical evidence in an emerging market, thereby employing Ordinary least square (OLS) to analyze data obtained from 56 financial institutions and insurance industry sectors covering the period of year 2000 to 2006, showed that earnings scaled by beginning of period price are positively and significantly related to cumulative returns and that earnings per share and book value per share are positively and significantly related to price per share. The study also found that value relevance of accounting information has changed since the market inception in 2000. These studies are limited as events after 2013 might have rendered them inconclusive as there are no demarcations between banks that operate with regional, national or international license which is pervasive as it is one of the determinants for foreign investments as banks with international authorization gets more international attention.

Uthman and Abdul-baki (2014) in their study on value-relevance of accounting information in Nigeria: analysts' perception in the IFRS regime haven employed descriptive statistics and log-linear analysis, asserts that a significant relationship was found between each of the independent variables and the dependent variable at 5% level of significance and provided explanations regarding the IFRS adoption as a bridge of the gap between accounting and finance measurement of information. It therefore holds that IFRS adoption has enhanced the value relevance of accounting information in Nigeria. The limitation of this study is that the submissions are strictly based on the perception of analysts and the provisions to cater for surprises where given less attention.

In another view, Omokhudu and Ibadin (2015) in their study which employed a pool and panel ordinary least square estimation and regression on 47 firms quoted on the Nigerian stock exchange posits that the coefficient estimates of earnings, cash flow and dividends are significant across the four estimation techniques employed(bottom line information: earnings per share, book value per share, dividend per share and cash flow from operations) in the study which implied that the variables are strongly associated with firm value and thus value relevant. As a result, the focus of investors should be on earnings, dividends and cash flows and less emphasis should be on book values. For regulators, in order to improve the investment scenario, accounting information communicated to the investing public must be of high quality to avoid sub-optimal investment decision by investors, with consequences for the economy. This gap created in this study is that financial and insurance companies are excluded in the analysis.

This is in contrary as seen in the research of Akpaka (2016) that covered the period of 2006 to 2009 of which a correlational research design was employed using the generalized least square revealed that pre- IFRS financial information is value relevant while post IFRS financial information has a very weak value relevance and post IFRS financial information has no relative value relevance over pre- IFRS financial information. This is in line with the study of Musa, Usman and Mamuda (2015) of which multiple regression is employed as a tool of analysis on data that was extracted from the books of 8 Nigerian listed conglomerate firms covering the pre adoption period of 2007 to 2011. the study revealed that that all the explanatory variables (fundamental accounting variables: book value per share, earnings per share, and change in earnings per share) statistically and significantly influence the explained variable which implies that accounting information published by listed conglomerate firms in Nigeria has high value relevance to the investors in making their investment decision on the firms. Specifically, earnings have more value relevance than book value. IFRS is a new reporting standard to Nigeria of which most firm adopted in 2012 and translated 2011 and 2010 from Nigerian GAAP to IFRS. However, to curb such anomaly that would have resulted from using a translated financial statement, the share price of three months after the fiscal year of 86 translations was used. This method has held in so many foreign IFRS research and has produce results .Also, the sample selection was dependant on firms that has adopted IFRS and was in existence in 2006. This method is not scientific and contains some element of bias, but with sufficient observations of 7 listed banks and 8 years period of study.

The research of Alabede (2016) on Impact of accounting standards on the value relevance of accounting information from Nigeria's listed firms: comparative study of pre and post IFRS adoption which covered the period of 2007 to 2014 with a sample population 66 non- financial companies operating in different sectors of the Nigerian economy and listed on Nigerian Stock Exchange (NSE), provided evidences that accounting information is more value relevant in post IFRS period but not significantly different from the pre IFRS period at least for the non-financial firms and also demonstrated that EPS is the most important accounting information content under IFRS. Though, Omura (2005) examined the value relevance of annually reported book value of five (5) Japanese Firms from 1995 to 2004 and documented that the book value of net assets has relevance for market value in the long run. It was established that mandatory International Financial Reporting Standards (IFRS) adoption increases value relevance significantly but it is limited only in the valuation of book value of equity (Misirlioglu, Yukseltuk, & Guermat, 2009). However, the study is foreign-base and may not be applicable in the Nigeria context.

Oyerinde (2009) study to focused on the value relevance of accounting data in Nigerian emerging markets in order to determine whether there is a relationship between accounting numbers and share prices. It was revealed that there is a significant positive relationship between share prices and earnings for the period 2001 to 2004. The researcher expanded the domain of the study two years later by examining the value relevance of accounting data in the Nigerian stock market, with a view to determining whether accounting information has the ability to capture data that affect share prices of firms listed on the Nigerian Stock Exchange (NSE). The study also examined the difference in perception of institutional and individual investors about the value relevance of various items of financial statements in equity valuation. The findings show that there is a significant relationship between accounting information and share prices of companies listed on the NSE (Oyerinde, 2011). This finding is consistent with Maradun (2009) who found that there is a positive relationship as well as significant impact between earnings and share price of building materials firms in Nigeria. The problem with the above studies is that the data used stopped at 2008 of which current studies might produce different results.

The study of Karunarathne and Rajapakse (2010) assessed the value relevance of earnings and cash flow in determining stock prices by considering the effect of firm size on value relevance. The researchers employed both return model and price model to ascertain the value relevance of financial statement information. The findings revealed that the value relevance of accounting information under the price model has more explanatory power than that of the return model, earnings per share was found to be more relevant in the study. Though, Belesis and Sorrs (2010) found that both earnings and book values are value relevant and can give explanation to variation in share price in the same degree. However, this study is made use of data from all business sectors except banking, finance, and insurance, which makes it impossible to pin the findings to a specific industry.

Abubakar (2010) research of which the Ohlson model was adopted to establishing the Level at which accounting information of the firms such as book values and earnings per share influence the share price valuation, found that accounting information published by the firms in Nigeria have no significant value relevance to the users of the information. However, the firms considered in this study are new economy firms known as Telecommunication, Media and Technology (TMT) firms whose assets are largely intangible and are not included in the financial statements. Another study by the same author revealed that book value per share, basic earnings per share and change in earnings per share are significant in determining share price of some selected listed Nigerian banks. The result was obtained from an experiment conducted to determine the extent of value relevance of Salisu Human Resources valuation model (popularly known as Salisu HRV Model). The experiment showed that the overall significance of the accounting information is stronger when Human Resources value is included compared to where it is not included in the financial statements of the selected banks (Abubakar, 2011).

Abiodun (2012) studied on the value relevance of accounting information in corporate Nigeria using simple descriptive statistics coupled with the logarithmic regression models. The study covered the period between 1999 and 2009, and taking 40 companies from various sectors of the Nigerian economy as sample. The study revealed that earnings is more value relevant than book values and by extension that, the information contained in the income statements, which is proxied by the earnings, dictates the corporate values of firms in Nigeria more than the information contained in the balance sheet, proxied by the book values.

Rahman (2012) examined the value relevance of earnings and book value of equity (individually and in aggregate), relative to price and return models, for Jordanian industrial companies for a ten years period (1992 to 2002). relative to price model, findings revealed that the value relevance of both earnings and book value increased individually, whilst the value relevance of earnings increased and book value became irrelevant in their combination. For the return model, the value relevance of earnings either individually or in aggregate has increased while that of book value has declined. Generally, it was found that earnings are more important in explaining the variance in share price and return than book value. Furthermore, the results showed that earnings and book value individually were more value relevant in price model. In contrast, these variables in aggregate are more value relevant in return model. The study shows that earnings help more in explaining market values in Jordanian industrial companies. This paper is the pioneer in using price and return models in a study in Jordan. Drawing a generalized notion based on the reviewed empirical studies, it can be observed that the value relevance of financial information with the adoption of IFRS has not given a clear direction and such, the findings and conclusion can be said to be inconclusive and has created . Some of these controversial issues can be attributed to the differences in accounting policies, existing in different companies, level of sophistication, industrial difference, time frame and methodologies employed in the research. Hence, need for further studies.

The underpinning theory for this paper is the "Clean surplus theory" which provides bases for the estimation of the value of a company's shares as it expresses relationship between book value, earnings and market price. Clean surplus accounting holds when all transactions affecting value of equity during the period other than transactions with equity holders are recognized on the income statement in the same period. Clean surplus accounting also stipulates that the period to period change must equal the forecasted net of investor's capital withdrawal or infusion. This theory validates the "valuation theory" developed by Ohlson (1995) to examine the value-relevance of earnings and book value of equity, contrary to the submission of the "market efficiency theory". Ohlson (1991) argues that due to the dividend policy irrelevance concept presented in Miller and Modigliani (1961), the value of a firm Should not be calculated based on dividends, but based on a more fundamental variable, which does not depend on dividends. Based on the analysis, Ohlson (1991) concludes that the variable (earnings) is a good replacement for dividends because earnings do not depend on dividends and could be used to estimate company value.

3. METHODOLOGY, DATA AND MODELS

The positivism/ post-positivism school of thought drives the view of the researcher being that the research is based on existing or already established facts of which the quantitative approach was employed using an experimental methodology as well as a parametric technique of data analysis for data extracted from secondary source. For the purpose of this study, correlational research design and ex-post factor was employed to examine IFRS adoption and value relevance of financial information of listed DMBs in Nigeria. This design is selected as it aids in establishing and providing explanation for the relationship between the variables under study. The population of the study consists of the 14 listed deposit money banks on the Nigerian Stock Exchange as at 31st December 2015 and the sample size was 7. The sample size was filtered based on the criteria that The Banks are listed within the scope of the study, have not been taken over by other banks or changed their names between 2008 - 2015 and have international authorization (license) as at 31 December, 2015. Data for the study were extracted from the 2008 to 2015 published annual reports and accounts of the selected banks posted on their website. This is in line with the requirement of the model adopted as quantitative data can be reliably obtained for analysis. General least square (GLS) multiple regression analysis are employed to analyze the stochastic longitudinal balanced panel data given the descriptive statistics, correlation matrix as well as summary of the regression result for the inferential statistics using STATA 13. The test for the normality of the data analyzed includes the skewness and kurtosis evaluation thereby checking the symmetrical compliance of the distribution. The Breusch-Pagan/Cook-Weisberg tests for heteroskedasticity and multi-collinearity test for auto correlation as well as the specification and normality of residuals were carried out to ensure the fitness of the model and the compliance with BLUE assumption.

The study adopted the Edward, Bells and Olhson (EBO) model in order to make inference on value relevance of financial information during the Pre and Post IFRS adoption Era. EBO model is a price model developed by Edward, Bells and Ohlson in 1995. Earning per share (EPS), Change in earning per share (CEPS) and Book value per share (BVPS) were the independent variables in the study while Share price (SP) was the dependent variable. Analyses were done on the bases of pre and post IFRS adoption.

To be able to conduct the regression analyses, the following models using EBO model have been formulated:

$$SP_{it} = a_0 + \beta_1 EPS_{it}^{pre} + \beta_2 CEPS_{it}^{pre} + \beta_3 BVPS_{it}^{pre} + e_{it} \quad (1)$$

$$SP_{it} = a_0 + \beta_1 EPS_{it}^{post} + \beta_2 CEPS_{it}^{post} + \beta_3 BVPS_{it}^{post} + e_{it} \quad (2)$$

Where:

a_0 = Constant or intercept

SP_{it} = Share price

EPS_{it} = Earnings per share of firm *i* at time *t*.

$CEPS_{it}$ = Change in earnings of firm *i* at time *t*.

$BVPS_{it}$ = Book value per share of firm *i* at time *t*.

β_{1-3} = Coefficient of explanatory variables

e_{it} = Error terms

The variables selected for this model are measured as stated in table 1.

Table 1: Variables Measurement

Variables	*Measurement*	*Source*
SP	The price of shares of listed DMBs three months after the fiscal year	Akpaka *et al* (2014)
EPS	Net profit attributable to shareholders divided by weighted average number of ordinary shares outstanding	Akpaka *et al* (2014), Musa (2015)
BVPS	The shareholders fund/equity divided by weighed average of ordinary shares outstanding	Akpaka *et al* (2014), Musa (2015)
CEPS	Present year EPS minus previous year EPS	Akpaka *et al* (2014), Musa (2015)

Source: researcher's variable definition table

4. RESULT AND DISCUSSION

The analysis was structured to present summary of descriptive statistics, Correlation matrix and summary of the regression results for both the Pre and Post compulsory IFRS adoption period computed using STATA 13.

Table 2 reports the summary of three accounting information variables and share prices of the seven (7) DMBs over 4 years of pre compulsory IFRS adoption (2008 to 2012). The average share price recorded as presented in the distribution is N 16.396 with the standard deviation of approximately N 13.863. This reveals that the average is expected since the standard deviation is small which means a little variance from the

Table 2: Descriptive statistics for Pre - IFRS

Variables	*Minimum*	*Maximum*	*Mean*	*Std. Deviation*	*Skewness*	*Kurtosis*
Share Price	2.80	48.00	16.396	13.863	1.099	2.948
Earnings Per Share	-0.03	3.45	0.791	0.924	-1.536	496
Book Value Per Share	0.49	42.06	9.150	9.850	2.00	6.533
Change in Earnings Per Share	-2.72	0.87	-0.077	0.795	-2.043	7.502

Source: extracted from STATA 13 print out result

mean or that the data is clustered around the mean. The highest share price recorded is N48.00 and the minimum is N2.80. Also, the table shows that EPS has a mean of N 0.791 and standard deviation of N0.924 approximately. The minimum EPS recorded during the period under study is N-0.03 and N3.45 as maximum value which thus demonstrates that the distribution has a wide range of EPS among the DMBs. Furthermore the table reveals that BVPS has a mean of N9.150 with a standard deviation of N9.850. The average is expected since the standard deviation is small which means a little variance from the mean or that the data is clustered around the mean. The minimum BVPS is N0.49 and maximum is N42.06. The result shows that the distribution has a wide range of BVPS among the DMBs as observed from the minimum and maximum value. Finally, The CEPS has an average of N-0.077 and standard deviation of N0.795 approximately, with a minimum and maximum value of N-2.72 and N0.87 respectively. The average is expected since the CEPS are derived from differences in the EPS and also the standard deviation is small which means a little variance from the mean or that the data is clustered around the mean.

Table 3: Correlation matrix for Pre - IFRS

Variables	*Share Price*	*Earnings Per Share*	*Book Value Per Share*	*Change in Earnings Per Share*
Share Price	1	0.563	-0.074	-0.046
Earnings Per Share		1	0.174	0.266
Book Value Per Share			1	0.170
Change in Earnings Per Share				1

Source: extracted from STATA 13 print out result

Table 3 shows the relationship between the variables used for pre IFRS analysis. The relationship between SP and EPS is positive at 0.563, this demonstrates that SP increases as EPS increase or vice versa. This is actually expected as a firm with high earnings is supposed to have a high price for its shares. Also, SP is negatively correlated to BVPS with a coefficient of -0.074 and to CEPS at -0.046. It therefore, suggests that an increase in SP results to decrease in book value and change in earnings of Nigerian DMBs or vice versa. EPS has a positive relationship with BVPS and CEPS with 0.174 and 0.266 respectively. Furthermore, CEPS is positively correlated to BVPS at 0.170.

The robustness test for multi-collinearity, heteroskedasticity, model specification and normaility of residuals was carried out to check the fitness of the research model and its element as to whether the result to be provided would be reliable. Generally, the result from the tests as seen the attached output of STATA 13 revealed that the model of this study is in line with the BLUE assumption and as such, inferences from the analysis can be relied upon.

In addition, hausman specification test was used to differentiate between fixed effect model and random effect model to determine the most suitable model for this study. The result obtained shows that chi2 is 2.52 and p-value is 0.4723 which suggests that fixed effect model is not suitable for the study. As such, Lagrangian multiplier test was conducted and the result shows a p-value of 1.00 which suggests that the pool OLS is the most suitable model for interpretation. The result of Hausman specification test and the Lagrangian multiplier test are attached in the appendix.

Table 4: Summary of regression for Pre – IFRS

Variables	*Co – Efficient*	*T – value*	*P - Value*
Constant	10.506	2.97	0.007
Earnings Per Share	9.602	3.81	0.001
Book Value Per Share	-0.215	-0.93	0.361
Change in Earnings Per Share	-3.324	-1.13	0.268
R^2			0.3807
Adjusted R^2			0.3033
F – Statistics			4.92
F – Significant value			0.0084

Source: extracted from STATA 13 print out result

Table 4 presents the summary of regression result of the pre IFRS adoption period. Therefore the initial equation would be restated as thus:

$$SP = 10.506 + 9.602EPS_{it}^{pre} - 0.215BVPS_{it}^{pre} - 3.324CEPS_{it}^{pre}$$

The results in table 4 show that Earnings per share has a coefficient of 9.602 which is accompanied by a T-value of 3.81 and a P-value of 0.007 (1% level of significance). It signifies that Earnings per share has positive and significant relationship with share price of Nigerian listed DMBs. It implies that the higher the earnings per share of the DMBs, the more the investors are willing to pay for the share price of the DMBs. i.e, For every N1 increase in earnings per share, the share price is expected to increase by approximately by N9.60k. the result of this finding is not surprising as it is in line to the prior expectation of the researcher that EPS has a strong and positive influence on stock prices in the capital market. In line with the clean surplus and valuation theory, the finding of this research is valid as it establishes that EPS is highly significant in determining the share price of Nigerian listed DMBs. This result is inline with the findings in the study of Maradun (2009), Oyerinde (2011) and Akpaka (2015) who established that there is a significant and positive relationship between share prices and earnings.

The results in table 4 show that the t-value for book value is -0.93 and its beta coefficient is -0.215 with a P-value of 0.361. This signifies that book value is insignificant in determining the share price of Nigerian listed DMBs. It implies that the higher the book value per share of the DMBs, the more the investors are willing to pay for the share price of the DMBs. For every N1 increase in book value per share, the share price is expected to drop by approximately N0.22K but it has no statistical significance, thus not value relevant. This is in contrary to the prior expectation of the researcher as we can asserted that BVPS might appeal to investor in seeking relationship to the value of firms. This finding is contrary to the studies of Omura (2005), and Gee-Jung, Kwon (2009) but in line with Abubakar (2010) and Akpaka (2015) whose study revealed an insignificant negative impact of book value per share on share prices.

The results in table 4 also provide us with enough evidence that change in earnings also has negative and insignificant impact on the share price of Nigerian listed DMBs. This can be confirmed from its coefficient value of -3.324 accompanied by a t-value of -1.13 with a P-value of 0.268. This implies that, the higher the change in earnings, the lower the share price. It implies that for every N1increase in change in earnings, share price decrease by N3.32k. the outcome of this finding is contrary to the expectation of the researcher as it was expected that an increase in earnings should impact share price positively. The finding is in line with Akpaka et al (2014) whose study revealed a negative and insignificant relationship between Change in earnings per share and Share Price.

Finally, the cumulative results of the coefficient of variation/determination (R^2) value (0.3807) shows that the cumulative influence of regressors are able to provide explanation for the variation in the regressand up to about 38% as indicated by the value of the R2 and remaining 62% is controlled by other factors. After taking care of some abnormalities, the adjusted R2 stood at about 30.33% (3.033) with 8% decrease from the coefficient of variation/ determination. In addition, the result of the F- statistic value of 4.92 shows that the variables for the study have been carefully selected and can be combined for a study. Hence, the model is well fitted going by the rule of thumb which stated that the minimum acceptable value is 2. This can be confirmed by the significant value of 0.0084, which shows that the cumulative impact of the regressors is significant at 1%. This implies that accounting information variables of Nigerian listed DMBs have positive impact on their share price. However, the above result clearly reveals that 38 per cent of variations in share price is dependent on pre-IFRS financial information holding other variables constant. This implies that pre-IFRS financial information is value relevant cumulatively. The finding is not surprising as it is in line with the prior expectation of the researcher. In reality, the investment decision has been established to be a function of published audited financial information. This further validated by the clean surplus theory. The result confirms the findings of Uthman and Abdul-baki (2014) and Akpaka *et al.* (2014).

Based on the aggregate result, we have sufficient evidence to reject the null hypothesis that states that: Pre- IFRS financial information has no significant value relevance in the Nigerian Listed DMBs.

Table 5: Descriptive statistics for Post - IFRS

Variables	*Minimum*	*Maximum*	*Mean*	*Std. Deviation*	*Skewness*	*Kurtosis*
Share Price	2.20	21.30	10.9128	6.6421	0.3559	1.7119
Earnings Per Share	-1.57	69.29	4.8707	14.871	3.6422	15.0608
Book Value Per Share	-40.07	69.17	0.4535	16.2718	2.0757	14.0073
Change in Earnings Per Share	0.17	61.21	11.0535	3.3589	3.3589	15.7795

Source: Extracted from STATA 13 print out result

Table 5 reports the summary of three accounting information variables and share prices of the seven (7) DMBs over 4 years of post-compulsory IFRS adoption period (2012 to 2015). The average share price recorded as presented in the distribution is N 10.91 with the standard deviation of approximately N 6.64. This reveals that the data is spread across the mean of SP and this insinuates that SP of DMBs differs relatively from one bank to the other. The highest share price recorded is N21.30 and the minimum is N2.20. Also, the table shows that EPS has a mean of N 4.87 and standard deviation of N14.87 approximately. The minimum EPS recorded during the period under study is N-1.57 and N69.29 as maximum value which thus demonstrates that the distribution has a wide range of EPS among the DMBs. Furthermore the table reveals that BVPS has a mean of N0.45 with a standard deviation of N16.27. The high standard deviation shows that the data is spread across the mean value. The minimum BVPS is N-40.07 and maximum is 69.17. The result shows that the distribution has a wide range of BVPS among the DMBs as observed from the minimum and maximum value. Finally, The CEPS has an average of N11.05 and standard deviation of N3.36 approximately, with a minimum and maximum value of N0.17 and N61.21 respectively. The standard deviation reflects that CEPS values are widely spread out around the mean because it is relatively large. Also, the result shows that the distribution has a wide range of CEPS among the DMBs reading from the minimum and maximum value.

Table 6: Correlation matrix for Post - IFRS

Variables	*Share Price*	*Earnings Per Share*	*Book Value Per Share*	*Change in Earnings Per Share*
Share Price	1	0.379	0.105	0.082
Earnings Per Share		1	-0.146	0.538
Book Value Per Share			1	-0.069
Change in Earnings Per Share				1

Source: extracted from SPSS 20 print out result

Table 6 shows the relationship between the variables used for post IFRS analysis. The relationship between SP and EPS is positive and strong with a coefficient of 0.38 approximately; this demonstrates that SP increases as EPS increase or vice versa. This is actually expected as a firm with high earnings is supposed to have a high price for its shares. On the contrary, SP has a weak correlation with BVPS with a coefficient of 0.082 and to CEPS at 0.105. It signifies that an increase in SP results to increase in book value and change in earnings of Nigerian DMBs or vice versa. EPS has a negative and weak relationship with BVPS and a positive relationship with CEPS with -0.146 and 0.538 coefficients respectively. Furthermore, CEPS is negatively correlated with BVPS at a coefficient value of -0.069.

The robustness test for multi-collinearity, heteroskedasticity, model specification and normaility of residuals was carried out to check the fitness of the research model and its element as to whether the result to be provided would be reliable. Generally, the result from the tests as seen the attached output of STATA 13 revealed that the model of this study is in line with the BLUE assumption and as such, inferences from the analysis can be relied upon.

However, Hausman specification test was used to differentiate between fixed effect model and random effect model to determine the most effective model. The result obtained shows that chi2 is 0.84 and p-value is 0.8408 which suggests that fixed effect model is not suitable for the study. As such, Lagrangian multiplier test was conducted and the result shows a p-value of 0.000 which suggests that the random effect is the most suitable model for interpretation. The result of Hausman specification test and the Lagrangian multiplier test are attached in the appendix.

Table 7: Summary of regression for Post - IFRS

Variables	*Co - Efficient*	*T – Statistics*	*T - Significant*	*Tolerance/ VIF*
Constant	0.634	9.084	0.00	
Earnings Per Share	-0.023	-0.774	0.444	0.285/ 3.511
Book Value Per Share	-0.011	-2.975	0.005	0.315/ 3.175
Change in Earnings Per Share	-0.015	-0.442	0.661	0.309/ 3.233
R				.627[a]
R^2				.393
Adjusted R^2				.342
F – Statistics				7.770
F – Sig.				0.00
Durbin Watson				1.662

Source: extracted from SPSS 20 print out result

Table 7 represents the summary of regression result of the post IFRS adoption period. Therefore the initial equation would be restated as thus:

$$SP = 0.634- 0.023EPS^{post}- 0.011BVPS^{post} -0.015CEPS^{post}$$

The result in table 7 shows that Earnings per share has a coefficient of -0.023, accompanied by a T-statistics of -0.774 with an insignificant value of 0.444. It signifies that Earnings per share have a negative and insignificant relationship with share price of Nigerian listed DMBs. It implies that the higher the earnings per share of the DMBs, the less the investors are willing to pay for the share price of the DMBs. i.e, For every N1 increase in earnings per share, the share price is expected to reduce by approximately by N0.02k. the result of this finding is surprising as it is contrary to the prior expectation of the researcher as it validates the market efficiency theory and contradicts the clean surplus and valuation theory. The negative coefficient finding on earnings is in contrary with the findings in the study of Maradun (2009), Oyerinde (2011) and akpaka (2015). Though, in line with the study of Akpaka (2015) in terms of value relevance as, it was revealed that Earnings per share is insignificant in determining share price.

The results in table 7 show that the t-statistics for book value is -0.011 and its beta coefficient is -2.975 with a significant value of 0.005 (1% level of significance). This signifies that book value is significant in determining the share price of Nigerian listed DMBs. It implies that the higher the book value per share of the DMBs, the less the investors are willing to pay for the share price of the DMBs. For every N1 increase in book value per share, the share price is expected to reduce by approximately by N0.01k. this is in line with the prior expectation of the researcher as validated by the theory in use in terms of value relevance though surprising for the fact that it has an inverse relationship. Also, this finding is valid in terms of reality as IFRS is based on fair value treatment which definitely as rendered book value per share value relevant. This finding is in line with the studies of Omura (2005), and Gee-Jung, Kwon (2009) but contrary to Abubakar (2010) and Akpaka (2015) whose study revealed an insignificant impact of book value per share on share prices.

The results in table 7 also revealed that change in earnings has a negative and insignificant impact on the share price of Nigerian listed DMBs. This can be confirmed from its coefficient value of -0.051 accompanied by a t-statistics of -0.442 at an insignificant statistical value of 0.66. This implies that, the higher the change in earnings the less the share price of Nigerian listed DMBs. It implies that for every N1increase in change in earnings, share price decrease by N0.02k. the outcome of this finding is contrary to the expectation of the researcher though in line with what is obtainable in the real world of Nigerian operations as the full adoption if the IFRS is still suffering some set back which still validates the fraud risk triangle as explain by Cressy (1959). Hence, influences investor confidence. This finding is in line with other researchers (Collins, *et al*, 1997; Lev & Zarowin, 1999; Francis & Schipper, 1999) whose researches found that Book Value usually is more value relevant than Earnings as a result of divergent accounting standards and that of Akpaka (2015) whose study revealed an insignificant relationship between Change in earnings per share and Share Price. Though contrary to the finding of Musa (2015) whose study revealed that earnings has more value relevance than book value.

To wrap it up, the cumulative results above put together show that the degree of association between the regressors and the regressand (R) is 0.627. This signifies that the combination of the regressors (EPS, BVPS and CEPS) is positively related to the regressand (SP) of up to 63%. The implication of this result is that for every change in the regressors, the regressand is bound to change. Thus for every unit increase in the regressors, the regressand also increases by 63%. Also, the coefficient of variation/determination (R2) value of 0.342 shows that the cumulative influence of regressors are able to provide explanation for the variation in the regressand up to about 39% as indicated by the value of the R2 and remaining 61% is controlled by other factors. After taking care of some abnormalities, the adjusted R2 stood at about 34% with 5%

decrease from the coefficient of variation/ determination (R2). However, the above result clearly reveals that 34 per cent of variations in share price is dependent on Post-IFRS financial information holding other variables constant. This implies that Post-IFRS financial information is value relevant. The finding is not surprising as it is in line with the prior expectation of the researcher. In reality, the investment decision has been established to be a function of published audited financial information and IFRS is expected to enhance more investor's confidence. This further validated by the clean surplus theory. The result confirms the findings of Uthman and Abdul-baki (2014) and Akpaka (2015). Based on the aggregate result, we have sufficient evidence to reject the null hypothesis that states that: Post- IFRS financial information has no significant value relevance in the DMBs.

Furthermore, the result of the F- statistic value of 7.770 shows that the variables for the study have been carefully selected and can be combined for a study. Hence, the model is well fitted going by the rule of thumb which stated that the minimum acceptable value is 2. This can be confirmed by the significant value of 0.000, which shows that the cumulative impact of the regressors is significant at 1% level of significant. This implies that accounting information variables of Nigerian listed DMBs have positive impact on their share price. The Durbin- Watson statistics of 1.662 indicates that there is absence of serial correlation/ auto correlation within the period of the study because the value is within the range of 1.5 to 2.5. This is in line with the rule of thumb that explained that any DW value that is close to zero depicts the presence of positive auto correlation while any DW value that is close to four shows the presence of negative auto correlation. But for the value that is close to two, it reveals the absence of serial correlation.

Finally, In line with the submission of Houthausen and Watts (2000) and as confirmed that relative value relevance can be ascertained by comparing the R- squared of accounting information involved in the analyses, The researcher therefore compared the R-squared of Pre IFRS financial information to that of post IFRS in order to ascertain the relative value relevance. Findings revealed Pre IFRS R-squared to be 0.420 while post IFRS R-squared is 0.393. The result of the finding is surprising as the general notion or aim of the Adoption of IFRS is to improve financial information quality. In reality, issues of complications, reluctance to full adoption and cost of adoption are major factors that must have led to this outcome. Based on the foregoing result we have enough evidence to fail to reject the null hypothesis that states: that there is no significant difference between the value relevance of financial information of Pre and post IFRS adoption in Nigerian DMBs. The finding of this study confirms the outcome of Musa (2009), Khanagha (2015) and Akpaka (2015) while it contradicts the findings of Agostino (2009), Uthman and Abdul-baki (2014) and Umoren & Enang (2015). We therefore conclude that post IFRS financial information does not have relative value relevance over and above pre IFRS financial information

5.1. CONCLUSION AND RECOMMENDATIONS

Changes in stock price expected to be a function of high quality financial information. i.e explaining a reasonable part of variation in stock price. A change in accounting and financial reporting should mean an improvement over the previously existing standard. The purpose of the study was to examine whether the quality of accounting (Value relevance of financial information) has increased in Nigeria after the adoption of IFRS in 2012. This study compares the characteristics of accounting amounts using a sample of Nigerian listed DMBs with international authorization reporting under NGAAP during 2008-2011, and IFRS during 2012-2015. Contrary to our expectations, the research results suggest a decrease in accounting quality over the last years. The study found that pre IFRS EPS is value relevant while post IFRS EPS is not value relevant, pre IFRS BVPS is value relevant while post IFRS BVPS is also value relevant at a weaker significant level. Also, pre IFRS CEPS is value relevant while post IFRS CEPS is not. Finally, the post IFRS aggregate has weak value relevance while pre IFRS aggregate financial information has stronger value relevance.

The research shows that earnings and book value of equity are becoming less value relevant during the IFRS period compared to the pre-IFRS period. Interestingly enough, the results from this analysis provides stronger evidence that the quality of financial reporting has decreased in Nigeria after the adoption of IFRS. It is of course dangerous to draw conclusions about the quality of financial reporting using this kind of measures. However, as a group they do offer some evidence of the in formativeness of financial reporting and could be a first indication that the adoption of IFRS may have been overwhelming to many Nigeria companies and has not resulted in a more efficient capital market. Although, further research needs to be done overtime and in other sectors in order to corroborate the results of this study using more and more representative data. In summary, it may be that the decrease in accounting quality is mainly driven by institutional factors such as cost of initial implementation, political instability, weak regulatory framework and lack of sophistication needed to bring out the benefits of IFRS adoption, rather than the new adopted standards. Thus, a policy dialogue is needed to discuss how Nigeria will improve on its facilities and overcome the obstacles facing the adoption, thereby incorporating IFRS fully into the Nigerian education system. Also, the financial Reporting Council and other local regulators who are to enforce consistency in IFRS policy adoption should equip Nigerians with adequate measure (e.g trainings and workshops) needed for the implementation) and also align IFRS reporting requirements to other local directives as this will enhance maximum benefits.

REFERENCES

Abdul-Baki, Z., Uthman, A. B., & Sannia, M. (2014). Financial ratios as performance measure: A comparison of IFRS and Nigerian GAAP. *Accounting and Management Information Systems*, *13*(1), 82.

Abiodun, B. Y. (2012). Significance of accounting information on corporate values of firms in Nigeria. *Research Journal in Organizational Psychology & Educational Studies 1 (2)*, *1*(2), 105-113.

Abubakar, S., (2010). *Value Relevance of Accounting Information of Listed New Economy Firms in Nigeria: An Empirical Investigation using Ohlson Model.*

Abubakar, S. (2011). *Human resource accounting and the quality of financial reporting of quoted service companies in Nigeria* (Doctoral dissertation, Ahmadu Bello University, Zaria)

Agostino, M., Drago, D., & Silipo, D. B. (2011). The value relevance of IFRS in the European banking industry. *Review of quantitative finance and accounting*, *36*(3), 437-457.

Akpaka, N., C., Chandrasekharan, C., V., & Abubakar., A, (2014), IFRS adoption and value relevance of financial information of listed deposit money banks in Nigeria, Accounting frontier: The official journal of Nigerian accounting association (NAA), 16(2), 83-11

Akpaka, N. C. (2005). *International financial reporting standards (IFRS) adoption and value relevance of financial information of listed deposit money banks in Nigeria* (Doctoral dissertation, Ahmadu Bello University, Zaria).

Alali, F. A., & Foote, P. S. (2012). The value relevance of international financial reporting standards: Empirical evidence in an emerging market. *The international journal of accounting*, *47*(1), 85-108.

Collins, D. W., Maydew, E. L., & Weiss, I. S. (1997). Changes in the value-relevance of earnings and book values over the past forty years. *Journal of accounting and economics*, *24*(1), 39-67.

Delloite, A. W. (2013). IFRS transition–Navigating complexities. *Delloite Global Services Limited, Partners in Learning.*

Edwards, E., & Bell, P. (1961). The theory and management of business income.

Francis, J., & Schipper, K. (1999). Have financial statements lost their relevance?. *Journal of accounting Research*, *37*(2), 319-352.

Galaen, A. and Stenhaim, T. (2010). Differences in accounting quality between Norwagian GAAP and IFRS. A master thesis submitted to Buskend University College, spring, Norway.

Ikpefan, O. A., & Akande, A. O. (2012). International financial reporting standard (IFRS): Benefits, obstacles and intrigues for implementation in Nigeria. *Business Intelligence Journal*, *5*(2), 299-307

Alabede, J. O. Impact of Accounting Standards on the Value Relevance of Accounting Information from Nigeria's Listed Firms: Comparative Study of Pre and Post IFRS Adoption.

Karunarathne, W. V. A. D., & Rajapakse, R. M. D. A. P. (2010). The value relevance of financial statements? Information: with special reference to the listed companies in colombo stock exchange.

Khanagha, J. B. (2011). International Financial Reporting Standards (IFRS) and value relevance of accounting information: evidence from Bahrain and United Arab Emirates stock markets. *African Journal of Social Sciences*, *1*(1), 101-114.

Kirkman, P. (2014). *Accounting Under Inflationary Conditions (RLE Accounting)*. Routledge.

Kirkulak, B., & Balsari, C. K. (2009). Value relevance of inflation-adjusted equity and income. *The International Journal of Accounting*, *44*(4), 363-377.

Neter, J., Kutner, M. H., Nachtsheim, C. J., & Wasserman, W. (1996). *Applied linear statistical models* (Vol. 4, p. 318). Chicago: Irwin.

Ohlson, J. A. (1991). The theory of value and earnings, and an introduction to the Ball Brown analysis. *Contemporary Accounting Research*, *8*(1), 1-19.

Ohlson, J. A. (1995). Earnings, book values, and dividends in equity valuation. *Contemporary accounting research*, *11*(2), 661-687.

Omokhudu, O. O., & Ibadin, P. O. (2015). The value relevance of accounting information: Evidence from Nigeria. *Accounting and Finance Research*, *4*(3), 20.

Omura, T. (2005). *The relationship between market value and book value for five selected Japanese firms* (Doctoral dissertation, Queensland University of Technology).

Oyerinde, D. T. (2009). Value relevance of accounting information in emerging stock market: The case of Nigeria. *Repositioning African Business and Development for the 21st Century Simon Sigué*.

Pologeorgis, N. (2013). The impact of combined U.S. GAAP and IFRS, CFA Institute of Certificate. cfainstitute.org/claritasSorros, J., & Belesis, N. (2012). Value relevance of earnings and book values for Greek listed firms.

To cite this article:

Olowe Idris Olawale & Shehu Usman Hassan (2021). IFRS Adoption and Value Relevance of Financial Information of Listed Deposit Money Banks in Nigeria. *International Journal of Economics and Financial Issues*, Vol. 2, Nos. 1-2, pp. 1-21